

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1. (Currently Amended) A computer-implemented method for controlling access to documents during a workflow, comprising:

upon entry of a base document into a workflow, creating a workflow working copy of the base document;

receiving a request to access the base document by a user;

determining using the identity of the user if the user should be provided access to the workflow working copy of the base document;

selectively providing the user access to the base document if it is not determined that the user should be provided access to the workflow working copy of the base document depending upon the identity of a user;

selectively providing the user access to the workflow working copy of the base document if it is determined that the user should be provided access to the workflow working copy of the base document depending upon the identity of a user; and

if the user is provided access to the workflow working copy of the base document, selectively providing access to perform operations on the workflow working copy of the base document depending upon the identity of the user.

2. (Previously Amended) The method of claim 1, further comprising:

storing access control list data in relation to the base document, the access control list data defining access controls on performing operations of the workflow working copy of the base document; and

storing security descriptor data in relation to the base document and the workflow working copy of the base document, the security descriptor data defining access controls on reading the base document and the workflow working copy of the base document.

3. (Previously Amended) The method of claim 2, wherein selectively providing access to perform operations on the workflow working copy of the base document depending upon the identity of a user, comprises:

determining using the access control list data stored in relation to the base document that a user has permission to perform an operation on the workflow working copy of the base document; and

allowing the user to perform the operation on the workflow working copy of the base document.

4. (Previously Amended) The method of claim 2, wherein the step of selectively providing access to perform operations on the workflow working copy of the base document depending upon the identity of a user, comprises:

determining using the access control list data stored in relation to the base document that a user does not have permission to perform an operation on the workflow working copy of the base document; and

denying the user access to perform the operation on the workflow working copy of the base document.

5. (Previously Amended) The method of claim 2, wherein the access control list data comprises information identifying for each of a plurality of operations, the set of users that have permission to perform the operation, and said act of selectively providing access to perform operations on the workflow working copy of the base document depending upon the identity of a user, comprises:

referencing the information identifying for each of a plurality of operations, the set of users that have permission to perform the operation; and

if the user is in the set of users that have permission to perform the operation, providing access to the operation.

6. (Previously Amended) The method of claim 2, wherein the access control list data comprises information identifying for each of a plurality of operations, the set of users that have permission to perform the operation, and said act of selectively providing access to perform operations on the workflow working copy of the base document depending upon the identity of a user, comprises:

referencing the information identifying for each of a plurality of operations,
the set of users that have permission to perform the operation; and
if the user is not in the set of users that have permission to perform the
operation, denying access to the operation.

7. (Previously Presented) The method of claim 5, wherein the set of users are defined in terms of the roles that have permission to perform the operation, and said act of referencing the information identifying for each of a plurality of operations, the set of users that have permission to perform the operation, comprises:

resolving for the user the set of roles to which the user has been assigned; and
determining using the set of roles to which the user has been assigned and the set of users defined in terms of the roles that have permission to perform the operation, whether the user has permission to perform the requested operation.

8. (Currently Amended) The method of claim 2, wherein ~~selectively providing a user access to the workflow working copy of the base document depending upon the identity of a user~~ determining using the identity of the user if the user should be provided access to the workflow working copy of the base document, comprises:

determining using the security descriptor data stored in relation to the base document and the workflow working copy document, ~~that if a~~ the user has permission to read the workflow working copy of the base document; ~~and~~
~~providing the user access to the workflow working copy of the base document.~~

9. (Cancelled)

10. (Currently Amended) The method of claim 2, wherein the security descriptor data comprises information identifying the set of users that have permission to read each of the base document and the workflow working copy of the base document, and said act of ~~selectively providing access to the workflow working copy of the base document depending on the identity of the user~~ determining using the identity of the user if the user should be provided access to the workflow working copy of the base document, comprises:

referencing the information identifying the set of users that have permission to read ~~each of the base document and~~ the workflow working copy of the base document; and
determining if the user is in the set of users that have permission to read the workflow working copy of the base document., ~~providing access to the workflow working copy of the base document.~~

11. (Currently Amended) The method of claim 10, wherein the set of users are defined in terms of the roles that have permission to read each of the base document and the workflow working copy of the base document, and said act of referencing the information identifying the set of users that have permission to read ~~each of the base document and~~ the workflow working copy of the base document, comprises:

resolving for the user the set of roles to which the user has been assigned; and
determining using the set of roles to which the user has been assigned and the set of roles that have permission to read ~~each of the base document and~~ the workflow working copy of the base document, whether the user has permission to read ~~the base document or~~ the workflow working copy of the base document.

12. (Original) A computer-readable media having stored thereon computer-executable instructions for performing the steps recited in claim 1.

13. (Currently Amended) A system for providing document isolation in a workflow environment, comprising:

a processor, wherein said processor is operable to execute instructions for performing the following acts:

maintaining for a base document undergoing a publishing workflow, a workflow copy of the base document;

maintaining access control data in relation to the base document and the workflow copy of the base document,

upon receipt of a request to access the base document, ~~selectively~~ determining based on the access control data ~~to provide if~~ access should be provided to the workflow copy of the base document; and

providing access to the workflow copy of the base document if it determined that access should be provided to the workflow copy of the base document; and
~~upon receipt of a request to access the base document, selectively determining based on the access control data to provide access to the workflow copy of the base document.~~
providing access to the base document if it is determined that access should not be provided to the workflow copy of the base document.

14. (Previously Amended) The system of claim 13, wherein the access control data comprises security descriptor data identifying the set of users that have permission to read the base document and the workflow copy of the base document, the set of users comprising reviewers and approvers

15. (Currently Amended) The system of claim 14, wherein said processor is operable to execute instructions for performing the following acts:
referencing the security descriptor data; and
determining that a user should be provided access ~~directed~~ to the workflow copy of the base document based on the security descriptor data.

16. (Previously Amended) The system of claim 15, wherein the security descriptor data identifies a set of roles corresponding to the set of users that have permission to read the base document and the workflow copy of the base document, and wherein said processor is operable to execute instructions for performing the act of determining the set of roles that a user has been assigned.

17. (Previously Amended) The system of claim 13, wherein the access control data comprises access control list data identifying the set of users that have permission to perform operations on the workflow copy of the base document.

18. (Previously Amended) The system of claim 17, wherein said processor is operable to execute instructions for performing the following acts:
referencing the access control list data; and

determining that a user should be allowed to perform an operation on the workflow copy of the base document based on the access control list data.

19. (Previously Amended) The system of claim 18, wherein the access control list data identifies a set of roles corresponding to the set of users that have permission to perform operations on the workflow copy of the base document, and wherein said processor is operable to execute instructions for performing the act of determining the set of roles that a user has been assigned.

20. (Cancelled) A method for controlling access to operations that may be performed on a document, comprising:

- upon creation of a workflow, creating a workflow copy of a base document;
- receiving a request to create a new operation that may be performed on the workflow copy of the base document;
- assigning a unique identifier to the new operation;
- updating an access control list to include an entry for the unique identifier for the new operation; and
- updating the access control list to include an entry identifying the roles that have access to the new operation.

21. (Cancelled) The method of claim 20, further comprising updating the access control list to change roles that have access to the new operation in response to a change from a first state to a second state by the workflow copy of the document in the workflow.

22. (Cancelled) The method of claim 20, wherein the workflow is a publishing workflow and the new operation is at least one of the following: review and approve.

23. (Cancelled) The method of claim 20, further comprising:

- receiving a request to perform the new operation on the workflow copy of the base document;
- determining using the access control list whether to allow access to the new operation.

24. (Cancelled) The method of claim 23, wherein determining using the access control list whether to allow access to the new operation comprises comparing a user's roles with the roles identified in the access control list as having access to the new operation.

25. (Withdrawn) A computer-implemented method of controlling access to documents, comprising:

- maintaining a first list defining who may access a base document;
- maintaining a second list defining who may perform operations on the base document;
- upon receipt of a request from a user to create a workflow, accessing the first list and the second list to determine whether the user may create a workflow relating to the base document;

- if the first list and the second list indicate the user may create a workflow relating to the base document, creating a copy of the base document; and

- while the copy of the base document is in the workflow, in response to requests to access the base document, accessing at least the first list to determine whether to provide access to the copy of the base document.

26. (Withdrawn) The method of claim 25, wherein maintaining a first list defining who may access a base document comprises maintaining a list of security descriptors.

27. (Withdrawn) The method of claim 25, wherein maintaining a second list defining who may perform operations on the base document comprises maintaining an access control list.

28. (Withdrawn) The method of claim 25, further comprising updating the second list upon creation of the copy of the base document to identify who may perform operations on the copy of the base document.

29. (Withdrawn) The method of claim 25, wherein maintaining a first list defining who may access a base document comprises maintaining a first list defining roles that may access a base document.

30. (Withdrawn) The method of claim 25, further comprising maintaining a third list defining who may access the copy of the base document.

31. (Previously Presented) The method of claim 1, further comprising replacing the base document with the working workflow document upon exit of the base document from the workflow.

32. (Previously Presented) The system of claim 13, further comprising upon exit of the base document from the workflow replacing the base document with the workflow copy of the base document.